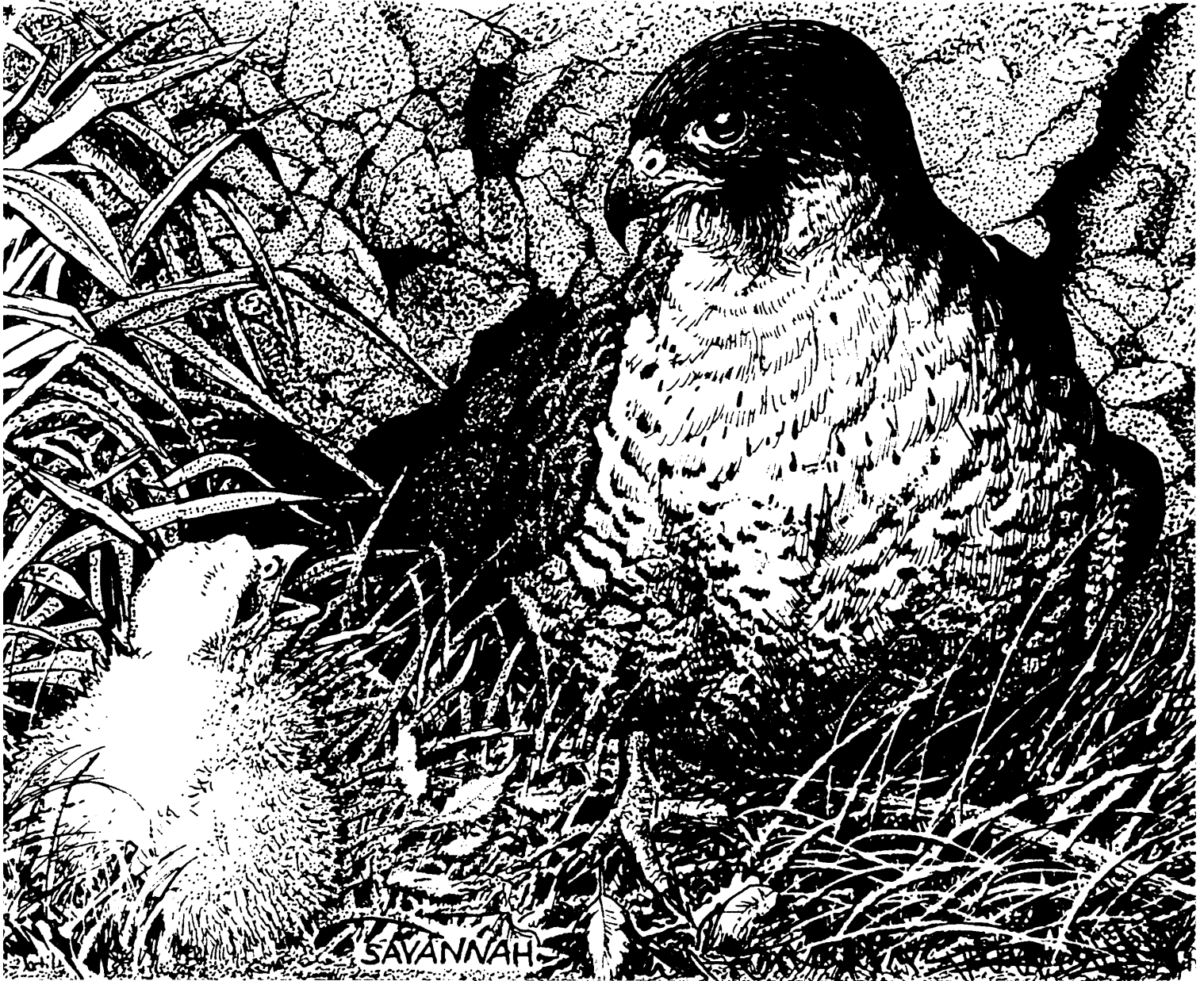




U.S. Fish & Wildlife Service

American Peregrine Falcon Proposed Monitoring Plan



USFWS illustration by Robert Savannah

American Peregrine Falcon (*Falco peregrinus anatum*) Proposed Monitoring Plan

Summary

The Endangered Species Act of 1973, as amended (16 U.S.C. 1531 *et seq.*) (Act) requires that recovered species removed from the Federal List of Endangered and Threatened Species (List) be monitored for not less than 5 years. The American peregrine falcon (*Falco peregrinus anatum*) was removed from the List on August 25, 1999, due to recovery.

Background

Section 4(g)(1) of the Act, requires that we implement a plan, in cooperation with all affected States, to effectively monitor for not less than 5 years, the status of all species that have been recovered and delisted. To meet the Act's monitoring requirement, and to facilitate the efficient collection of data, a sampling approach capable of assessing the population status of the American peregrine falcon will be implemented. At any time during the monitoring program if information indicates that protected status under the Act should be reinstated, we (the U.S. Fish and Wildlife Service) can initiate listing procedures including, if appropriate, an emergency listing.

The proposed American peregrine falcon monitoring plan was developed in cooperation with State resource agencies, recovery team members, and interested scientists, and will be carried out in collaboration with Federal, State, and private cooperators. The proposed monitoring will start in the spring of 2002. Surveys will be conducted every 3 years, for a total of five surveys. Monitoring will include the collection of information on the population trends and nesting success. At the end of each triennial monitoring period, and at the conclusion of the 13-year monitoring program, we will review all available information to determine whether the status of the falcon is continuing to improve.

Monitoring Plan

A. Regions

We have designated five geographical survey regions within the U.S. range of the American peregrine falcon. Surveys will be conducted within each region, although every State listed may not be sampled. Those regions are:

- (1) Interior Alaska Region;
- (2) Pacific Region: Washington, Oregon, California, Idaho, and Nevada;
- (3) Rocky Mountain/Southwest Region: Colorado, Kansas, Montana, Nebraska, North and South Dakota, Utah, Wyoming, Arizona, New Mexico, Oklahoma, and Texas;
- (4) Great Lakes/Mid-Western Region: Illinois, Indiana, Iowa, Michigan, Minnesota, Missouri, Ohio, and Wisconsin;
- (5) Eastern Region: Maine, New Hampshire, Vermont, New York, Massachusetts, Connecticut, Pennsylvania, New Jersey, Delaware, Virginia, and North Carolina.

B. Monitoring Strategy

Nesting territories with a history of occupancy, reasonable accessibility, good visibility, and geophysical permanence will be considered for inclusion within the sample of monitored territories. Each territory will be visited twice, once during late courtship, egg laying, or incubation, and once late in the nestling stage. The intent of the first visit will be to verify occupancy; the second visit will be to determine the presence or absence of young (nest success). If it can be accomplished without an additional visit, the number of chicks (productivity) will be recorded. The nests themselves will not be visited, they will be observed from nearby locations to avoid disturbing them.

Approximately 20 percent of the known breeding population (a minimum of 271 territories) will be monitored. The monitoring will include a representative sample of habitats used by breeding peregrine falcons. However, some States, Service regions, and programs may elect to continue to monitor site occupancy and productivity of a greater proportion of known American peregrine falcon nesting pairs within their jurisdiction. Additional efforts will improve the information collected.

C. Territory Selection

In each of the five geographical regions, the following minimum number of territories will be selected and surveyed within the listed index areas:

- (1) Interior Alaska Region: 46 territories on the Yukon River system.
- (2) Pacific Region, 60 territories: Northern interior and central coast California, 30 territories; the Cascade Mountains and coast of Oregon, 15 territories; Puget Sound and coast of Washington, 15 territories.
- (3) Rocky Mountain/Southwest, 70 territories: Yellowstone ecosystem, 20 territories; Central and Southern Rockies, 25 territories; Colorado Plateau and adjacent low desert, 25 territories.
- (4) Great Lakes/Mid-Western Region, 45 territories: Lake Superior and Mississippi River, 15 territories; Lake Michigan, 15 territories; Detroit, Lake Erie, and Ohio, 15 territories.
- (5) Eastern Region, 50 territories: Mid-Atlantic coast, 25 territories; New England and northern New York, 15 territories; Southern New England and the central Appalachians, 10 territories.

D. Parameters

- (1) Territory Occupancy - the presence or absence of a male and female peregrine at each surveyed breeding territory will be documented.
- (2) Nest Success - the presence or absence of nestlings will be determined at each monitored territory .
- (3) Productivity - number of young per nest will be recorded only if it can be done within the limits of the two scheduled visits.

E. Implementation

The Pacific Region of the Service will oversee the American peregrine falcon monitoring plan and will designate a National Coordinator to carry out those responsibilities.

(1) National Coordinator Responsibilities will include:

- (a) Convening a working group of Regional Coordinators, who will be identified from each of the five geographical regions within the U.S. range of the American peregrine falcon, to plan and implement the triennial surveys and make recommendations based on survey results;
- (b) Compiling survey results provided by Regional Coordinators, write triennial monitoring reports, and ensure that all monitoring plan cooperators receive copies. The national coordinator will provide copies of the monitoring reports to the interested public by publishing a notice of availability in the *Federal Register*, provide copies to the Director, Regional Directors, and also to the Assistant Directors for Endangered Species, and for Migratory Birds and State Programs;
- (c) Preparing the final monitoring report; and if it is needed, recommend future monitoring to the Fish and Wildlife Service Regional Director based on information collected during the 13-year monitoring period, and on input from monitoring plan cooperators;
- (d) Annually informing the Fish and Wildlife Service Director, Regional Directors, and the assistant Directors for Endangered Species and for Migratory Birds and State Programs on the status of the monitoring plan; and
- (e) Working with all willing partners to identify and secure funding for triennial field surveys.

(2) Regional Coordinator Responsibilities.

Working groups, composed of knowledgeable and interested stakeholders, will be established in each of the five geographic regions identified within the U.S. range of the American peregrine falcon. A Regional Coordinator will be identified from each group whose responsibilities will include:

- (a) Participating in working group meetings, assist in the planning and implementation of the triennial surveys, and make recommendations based on survey results;
- (b) Coordinating the collection and compilation of regional survey results by:
 - (i) providing results to the National Coordinator for inclusion into the national triennial survey report to be used to assess the status of the American peregrine falcon range-wide, and
 - (ii) using these results to write a regional triennial survey report to assess the regional status of the American peregrine falcon.
- (c) Ensuring that cooperators conducting field surveys are trained and qualified and approved survey protocols are used in the collection of data;

(d) Providing continuity in planning and field personnel to bridge the 2-year interim in field surveys;

(e) Working with all willing partners to identify and secure funding for triennial field surveys.

F. Timetable

The designated 13-year monitoring period should be sufficient in length to detect an inability of the population to be self-sustaining. In addition, spreading the surveys over 13 years will allow adequate time to plan each survey, and secure the necessary funding. Surveys will be conducted in 2002, 2005, 2008, 2011, and 2014.

G. Final Evaluation

Using the expertise and advice of our cooperators, we will evaluate the results of the surveys to determine the status of the American peregrine falcon after each survey. A range wide status review for evaluation of the need to re-list the American peregrine falcon under the Act will be recommended if:

(1) monitored territories do not maintain 80 percent occupancy range-wide over the 13-year monitoring period; or

(2) occupancy at monitored territories drops to 70 percent occupancy range-wide between triennial surveys; or

(3) monitored territories do not maintain 70 percent nest success range-wide over the 13-year monitoring period; or

(4) nest success at monitored territories drops to 60 percent nest success range-wide between triennial surveys.

Based on the above four parameters, if depressed reproduction is detected, addled eggs may be collected and evaluated for residue concentrations of organochlorine pesticides, PCBs, dioxins, furans, and mercury in conjunction with the monitoring plan if funding is available. The take of live eggs will not be authorized. Only addled eggs (i.e., those that do not hatch) taken from both failed and successful nests will be collected. The analyses may be expanded, if necessary and if funds are available.

Upon completion of the 13-year monitoring period, the Service will review all available information to determine if continuation of monitoring is appropriate. The decision to continue or end monitoring will be included in the final monitoring report, which will be available to the public. If the American peregrine falcon population is stable range-wide and no significant threats to the subspecies are identified, then monitoring may be terminated.

If, at any time during the monitoring, data from the index areas indicate a regional or range-wide decline, or if factors are identified that have the potential to cause population decline, we will work with all willing partners to identify and minimize the threats. The Service always has the option of proposing to re-list the peregrine falcon. Any consideration for re-listing will be based on the range-wide status of the American peregrine falcon, not the individual status of any one of the five geographical regions. The objective of the five geographical regions is to ensure that surveys are conducted within the variety of habitats used by breeding American peregrine falcons.

H. Canada

The Canadian Wildlife Service coordinates a national range-wide American peregrine falcon population survey once every 5 years and will conduct three surveys (2000, 2005, and 2010) during the 13-year monitoring period. The results of these national surveys will be considered when evaluating the status of the American peregrine falcon in North America.